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| PPLICATION NO.       | FI         | LING DATE     | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|----------------------|------------|---------------|----------------------|---------------------|------------------|
| 09/981,977           | 10/17/2001 |               | Steve Dispensa       | 1574 1819           |                  |
| 28004                | 7590       | 04/07/2006    |                      | EXAMINER            |                  |
| SPRINT<br>6391 SPRIN | трарич     | U A 37        | NAWAZ, ASAD M        |                     |                  |
| KSOPHT01             |            | VAI           | ART UNIT             | PAPER NUMBER        |                  |
| OVERLANI             | PARK,      | KS 66251-2100 | 2155                 |                     |                  |

DATE MAILED: 04/07/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

|   |  | Application No.   | Applicant(s)  |  |  |  |
|---|--|---|---|--|--|--|
|   |  | 09/981,977  | DISPENSA ET AL.   |  |  |  |
|   | Office Action Summary  | Examiner  | Art Unit  |  |  |  |
|   |  | Asad M. Nawaz   | 2155  |  |  |  |
| Period fo   | The MAILING DATE of this communication apports.  | pears on the cover sheet with the c   | orrespondence address   |  |  |  |
| WHIC<br>- Exte<br>after<br>- If NC<br>- Failt<br>Any  | ORTENED STATUTORY PERIOD FOR REPL' CHEVER IS LONGER, FROM THE MAILING Donsions of time may be available under the provisions of 37 CFR 1.1 SIX (6) MONTHS from the mailing date of this communication. O period for reply is specified above, the maximum statutory period of ure to reply within the set or extended period for reply will, by statute reply received by the Office later than three months after the mailing ed patent term adjustment. See 37 CFR 1.704(b). | ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tim will apply and will expire SIX (6) MONTHS from , cause the application to become ABANDONE   | N.<br>nely filed<br>the mailing date of this communication.<br>D (35 U.S.C. § 133). |  |  |  |
| Status  |  |   |   |  |  |  |
| 1)  🔀   | Responsive to communication(s) filed on <u>05 Ja</u>   | anuary 2006   |   |  |  |  |
|   | This action is <b>FINAL</b> . 2b) This action is non-final.  |   |   |  |  |  |
| 3)  | Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.  |   |   |  |  |  |
| Disposit  | ion of Claims  |   |   |  |  |  |
| 5)  | Claim(s) 1.4-21.24-41 and 44-60 is/are pendin 4a) Of the above claim(s) is/are withdray Claim(s) is/are allowed. Claim(s) 1.4-21.24-41 and 44-60 is/are rejecte Claim(s) is/are objected to. Claim(s) are subject to restriction and/o   | wn from consideration.  |   |  |  |  |
| Applicat  | ion Papers   |   |   |  |  |  |
| 10)   | The specification is objected to by the Examine The drawing(s) filed on is/are: a) accomplicant may not request that any objection to the Replacement drawing sheet(s) including the correct The oath or declaration is objected to by the Examine   | epted or b) objected to by the Education of the Education of by the Education of the drawing (s) is object to be set of the drawing (s) is object of the drawing | e 37 CFR 1.85(a).<br>ected to. See 37 CFR 1.121(d).                                 |  |  |  |
| Priority (  | ınder 35 U.S.C. § 119  |   |   |  |  |  |
| <ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents have been received.</li> <li>2. Certified copies of the priority documents have been received in Application No</li> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul> |  |   |   |  |  |  |
| 2) 🔲 Notic<br>3) 🔲 Infori   | e of References Cited (PTO-892) e of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449 or PTO/SB/08) r No(s)/Mail Date   | 4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal Pa   |   |  |  |  |

67)

### **DETAILED ACTION**

1. This action is responsive to the amendment received 1/5/06. Claims 2-3, 22-23, and 42-43 have been canceled. Claims 1, 21, and 41 have been amended. No new claims have been added. Claims 1, 4-21, 24-41 and 44-60 are pending.

## Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 1-8, 15-18, 21-28, 35-38, 41-48, and 55-58 are rejected under 35 U.S.C. 103(a) as being anticipated by Giroir et al (US Patent No. 6,829,642) further in view of Vogel et al (USPN 6,807,515).

As to claim 1, Giroir teaches a method of operating a probe device for testing a broadband wireless system, the method comprising: executing the plurality of tests wherein the broadband wireless system is located on a client-side (col 13, lines 51-55) and the tests are executed to measure performance of the broadband wireless communication system based on the instruction; (Abstract; col 6, lines 5-30; col 14, lines 20-25)

determining performance information from the plurality of tests; (col 10, lines 17 -

and storing the performance information in a memory of the probe device.(col 11, lines 15-35 and 39-48)

However, Giroir does not explicitly indicate receiving an instruction into the probe device through a wireless router to execute a plurality of test. Vogel et al teaches a wireless network monitoring system in which an instruction is received into the probe device through a wireless router to execute a plurality of test. (Fig 4 numerals 400-406, col 2, lines 15-23;)

It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate the teachings of Vogel et al into those of Giroir to allow the monitoring system and method for measuring wireless service availability and performance to discover problems and allow their correction based on a user's command and parameters especially via widely-available wireless equipment.

As to claim 4, Giroir teaches the method of claim 1 wherein one of the plurality of tests comprises a web surfing test.(col 10, lines 17-67; col 11, lines 30-35)

As to claim 5, Giroir teaches the method of claim 4 wherein the web surfing test comprises transferring a request for a web page and receiving the web page. (col 10, lines 17-67; col 11, lines 30-35)

As to claim 6, Giroir teaches the method of claim 1 wherein one of the plurality of tests comprises a bulk file transfer test. (col 10, lines 17-67; col 11, lines 30-35)

As to claim 7, Giroir teaches the method of claim 6 wherein the bulk file transfer test comprises generating and transmitting a request to retrieve files from a file server and receiving the files from the server. (col 10, lines 17-67; col 11, lines 30-35)

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As to claim 8, Giroir teaches the method of claim 6 wherein the bulk file transfer test comprises transmitting files to a file server. (col 10, lines 17-67; col 11, lines 30-35)

As to claim 15, Giroir teaches the method of claim 1 further comprising transmitting the performance information from the probe device.(Abstract; col 6, 5-15)

As to claim 16, Giroir teaches the method of claim 1 further comprising retrieving the performance information from the memory.(Abstract; col 11, lines15-25 and 39-48)

As to claim 17, Giroir teaches the method of claim 1 wherein the performance information comprises delay.(col 12, lines 3-10)

As to claim 18, Giroir teaches the method of claim 1 wherein the performance information comprises download speed.(col 10, lines 55-65)

Claims 21-28, 35-38, 41-48, and 55-58 are essentially the software product and apparatus of the above claim and thus are rejected under similar rationale.

4. Claims 9-12, 19-20, 29-32, 39-40, 49-52, and 59-60 are rejected under 35 U.S.C. 103(a) as being unpatentable over Giroir et al (US Patent No 6,829642) further in view of Vogel et al (USPN 6,807,515) further in view of Lipa et al (US Patent No 6,061,722).

As to claim 9, Giroir and Vogel et al teach the method of claim 1 but do not explicitly indicate one of the plurality of tests comprising a ping test. Lipa et al, however, teaches the method of claim 1 wherein one of the plurality of tests comprises a ping test to measure delay (col 2, lines 14-18; col 7, lines 10-50).

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate the teachings of Lipa into those of Giroir to make the

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system more efficient. Probe devices that test network resources, functionality, and numerous metrics are known in the art. Using one probe device would eliminate the need for multiple devices, their drivers, and many other components that require system resources.

As to claim 10, Giroir and Vogel teach the method of claim 1 but do not explicitly indicate one of the plurality of tests comprising a raw channel capacity test. Lipa et al, however, teaches the method of claim 1 wherein one of the plurality of tests comprises a raw channel capacity test.(col 9, lines 1-60)

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate the teachings of Lipa into those of Giroir to make the system more efficient. Probe devices that test network resources, functionality, and numerous metrics are known in the art. Using one probe device would eliminate the need for multiple devices, their drivers, and many other components that require system resources.

As to claim 11, Lipa et al teaches the method of claim 10 wherein the raw channel capacity tests comprises a bit error rate test. (col 9, lines 1-60)

As to claim 12, Lipa et al teaches the method of claim 1 wherein one of the plurality of tests comprises a forward error correction test. (col 9, lines 1-60)

As to claim 19, Giroir and Vogel et al teach the method of claim 1 but do not explicitly indicate the performance information comprising a the number of dropped packets. Lipa et al, however, teaches the method of claim 1 wherein the performance information comprises number of dropped packets.(col 2, lines 14-18)

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate the teachings of Lipa into those of Giroir to make the system more efficient. Probe devices that test network resources, functionality, and numerous metrics are known in the art. Using one probe device would eliminate the need for multiple devices, their drivers, and many other components that require system resources.

As to claim 20, Giroir and Vogel et al teach the method of claim 1 but do not explicitly indicate the performance information being the number of acknowledgment packets. Lipa et al, however, teaches the method of claim 1 wherein the performance information comprises number of acknowledgement packets. (Fig 4; col 9, 10-30)

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate the teachings of Lipa into those of Giroir to make the system more efficient. Probe devices that test network resources, functionality, and numerous metrics are known in the art. Using one probe device would eliminate the need for multiple devices, their drivers, and many other components that require system resources.

Claims 29-32, 39-40, 49-52, and 59-60 are essentially the software product and apparatus of the above claim and thus are rejected under similar rationale.

5. Claims 13-14, 33-34 and 53-54 are rejected under 35 U.S.C. 103(a) as being unpatentable over Giroir (US Patent 6,829,642) further in view of Vogel et al (USPN 6,807,515), and further in view of Fijolek et al (US Patent No 6,553,568).

As to claim 13, Giroir and Vogel et al teach the method of claim 1 but do not explicitly indicate one of the plurality of tests comprising an out of lock indicator test. wherein one of the plurality of tests comprises an out of lock indicator test. (col 8, lines 10-40)

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to incorporate the teachings of Lipa into those of Giroir to make the system more efficient. Probe devices that test network resources, functionality, and numerous metrics are known in the art. Using one probe device would eliminate the need for multiple devices, their drivers, and many other components that require system resources.

As to claim 14, Fijolek teaches the method of claim 13 wherein the out of lock indicator test comprises determining a presence of a clean Quadrature Amplitude Modulation signal.(col 8, lines 10-40)

Claims 33, 34 and 53, 54 are rejected for essentially being the software product and apparatus of the above claim and thus are rejected under similar rationale.

#### Response to Arguments

6. Applicant's arguments filed have been fully considered but they are not persuasive. In substance, the applicant argues that the claims as presented in the amendment overcomes the prior art of record because neither Giroir nor Vogel teach or

suggest receiving an instruction into the probe device through a wireless broadband router coupled with the broadband wireless system to execute a plurality of tests wherein the probe device and the wireless broadband router are located on a customer-side.

In response, as noted in the above rejection, it is true that Niether Giroir nor Vogel *separately* teach the limitation in question. However, Giroir teaches the above-mentioned system on a client-side while Vogel teaches the instruction being received through the a wireless router (see above rejection for further explanation). Therefore, Giroir and Vogel, in combination, still teach the invention as currently claimed.

7. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

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## Conclusion

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Asad M. Nawaz whose telephone number is (571) 272-3988. The examiner can normally be reached on M-F 8-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Saleh Najjar can be reached on (571) 272-4006. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

AMN.

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